Performance Data Sheet

AE4430Z-AA1A

General Information

Model	AE4430Z-AA1A	**Refrigerant**	R-404A
Test Condition	ASHRAE	**Performance Test Voltage**	115V ~ 60HZ
Return Gas	20°C (68°F) RETURN GAS	**Motor Type**	CSIR

Performance Information

Evap Temp (°F)		Condensing Temperature (°F)						
		80	**90**	**100**	**110**	**120**	**130**	**140**
5	Btu/h	1930	1780	1620	1450	1270	1080	888
	Watts	262	275	289	301	311	319	323
	Amps	4.05	4.18	4.28	4.35	4.40	4.44	4.48
	Lb/h	29.8	29.1	28.2	27.2	25.9	24.4	22.6
10	Btu/h	2170	2010	1830	1650	1460	1250	1040
	Watts	270	285	300	314	326	336	343
	Amps	4.09	4.23	4.33	4.41	4.47	4.53	4.58
	Lb/h	33.5	32.9	32.1	31.0	29.8	28.3	26.5
15	Btu/h	2430	2260	2070	1860	1650	1430	1200
	Watts	278	295	312	327	341	353	362
	Amps	4.13	4.27	4.39	4.48	4.55	4.62	4.69
	Lb/h	37.7	37.1	36.3	35.3	34.0	32.5	30.6
20	Btu/h	2730	2530	2320	2100	1870	1620	1370
	Watts	285	304	322	340	356	370	382
	Amps	4.17	4.32	4.45	4.55	4.64	4.72	4.81
	Lb/h	42.5	41.9	41.1	40.0	38.7	37.0	35.0
25	Btu/h	3060	2840	2600	2350	2090	1820	1540
	Watts	291	312	332	352	371	387	401
	Amps	4.21	4.37	4.51	4.62	4.72	4.82	4.93
	Lb/h	47.8	47.2	46.3	45.2	43.7	42.0	39.9
30	Btu/h	3420	3170	2910	2630	2340	2040	1720
	Watts	296	318	341	363	384	403	420
	Amps	4.25	4.42	4.56	4.69	4.81	4.93	5.05
	Lb/h	53.8	53.2	52.2	50.9	49.3	47.4	45.1
35	Btu/h	3820	3530	3240	2930	2600	2260	1910
	Watts	299	324	349	373	397	418	438
	Amps	4.28	4.46	4.62	4.76	4.90	5.03	5.17
	Lb/h	60.6	59.8	58.6	57.2	55.4	53.3	50.8
40	Btu/h	4250	3930	3590	3250	2880	2510	2110
	Watts	301	328	355	382	408	432	454
	Amps	4.31	4.50	4.67	4.82	4.97	5.13	5.29
	Lb/h	68.0	67.0	65.8	64.1	62.1	59.7	56.9

45	Btu/h	4720	4360	3980	3590	3180	2760	2330
	Watts	300	330	359	389	417	445	470
	Amps	4.32	4.52	4.70	4.87	5.04	5.22	5.40
	Lb/h	76.2	75.1	73.6	71.7	69.5	66.8	63.7
50	Btu/h	5220	4810	4390	3960	3510	3040	2550
	Watts	298	329	361	394	425	455	483
	Amps	4.32	4.53	4.73	4.91	5.10	5.29	5.50
	Lb/h	85.3	83.9	82.2	80.0	77.4	74.4	71.0
55	Btu/h	5760	5310	4840	4350	3850	3330	2790
	Watts	292	327	361	396	431	464	495
	Amps	4.30	4.52	4.73	4.94	5.14	5.36	5.59
	Lb/h	95.2	93.6	91.5	89.1	86.2	82.8	78.9
60	Btu/h	6340	5840	5310	4770	4220	3640	3050
	Watts	284	321	359	397	434	471	505
	Amps	4.26	4.50	4.72	4.94	5.17	5.41	5.66
	Lb/h	106	104	102	98.9	95.6	91.9	87.6

COEFFICIENTS	CAPACITY	POWER	CURRENT	MASS FLOW
C1	2.623168E+03	2.035797E+02	7.582120E-01	3.081818E+01
C2	4.183478E+01	4.897722E-01	1.264082E-02	1.972426E-01
C3	-8.504756E+00	-6.972785E-01	7.491422E-02	-4.861825E-02
C4	1.210391E+00	-1.841750E-02	9.484198E-05	1.488972E-02
C5	2.204331E-02	5.322666E-03	-2.744225E-04	6.859487E-03
C6	-3.166578E-02	2.486245E-02	-5.273084E-04	2.338652E-04
C7	1.364815E-03	-3.304791E-04	-3.787168E-06	5.960898E-05
C8	-8.153123E-03	2.248053E-04	1.546295E-06	-7.944512E-05
C9	-7.905978E-04	1.288275E-04	2.143896E-06	-2.324310E-05
C10	-2.644900E-05	-1.053619E-04	1.266722E-06	-3.489546E-06

Value = C1 + C2 * Te + C4 * Te^2 + C7 * Te^3 + (C3 + C5 * Te + C8 * Te^2) * Tc + (C6 + C9 * Te) * Tc^2 + C10 * Tc^3

Te = Evaporator Temperature

Tc = Condensing Temperature